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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/981,388	10/17/2001	Wayne John Harrison	JAMES-014B	6815

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EXAMINER	
MUSSER, BARBARA J	

ART UNIT	PAPER NUMBER
1733	

DATE MAILED: 06/02/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)
	09/981,388	HARRISON, WAYNE JOHN
	Examiner	Art Unit
	Barbara J. Musser	1733

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *15 December 2003*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-10* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-10* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

2. Claims 1-10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Brownlee(EP 0319252A2) in view of Olvey(WO 90/06222) and Peers, Jr. et al.(U.S. Patent 4,544,597).

Brownlee discloses forming a corrugated board by bonding a metallized polyester film to a paper liner and then adhering the paper liner to a corrugated web.(pg. 4, ll. 56- Pg. 5, ll. 5) The reference does not disclose corona treating or chemically treating the side of the film opposite the metallized layer prior to bonding it to the paper liner. Olvey discloses that corona treatment or chemical treatment of polymer films creates minute cracks in the film, resulting in a greater bonding area.(Pg. 9, ll. 11-17) It would have been obvious to one of ordinary skill in the art at the time the invention was made to corona or chemically treat one side of the polymer film prior to bonding to create a larger surface area for bonding. One in the art would appreciate that the corona or chemical treatment would occur on the side opposite the metallized side so that no damage was done to the metal layer.

Brownlee does not specifically state that the liner is applied to the corrugated sheet while corrugating the sheet but rather states it occurs in an in-line process where

the liner is applied to one side of a corrugated web. Peer, Jr. et al. discloses a corrugating apparatus wherein the liner is applied to the corrugated sheet while corrugating the sheet, the liner comprising a metallized polymer film laminated to a paper liner.(Figure 2; Col. 2, ll. 29-34) It would have been obvious to one of ordinary skill in the art at the time the invention was made to use the corrugating apparatus of Peer, Jr. et al. to form the corrugated board of Brownlee and Olvey since the corrugating apparatus of Peer, Jr. et al. is intended for use in bonding metallized polymer/paper laminates to corrugated webs, is economical, and does not significantly alter conventional corrugating apparatus rendering it easy to use.(Col. 1, ll. 35-39; Col. 2, ll. 29-34; Col. 8, ll. 18-23)

Regarding claims 2 and 8, Olvey discloses that biaxially oriented polyester can be used as the polymer film.(Pg. 4, ll. 10) Peer, Jr. et al. discloses that orienting the film increases the tear strength.(Col. 6, ll. 15-19) It would have been obvious to one of ordinary skill in the art at the time the invention was made to biaxially orient the polyester film of Brownlee since it is known to use biaxially oriented film in corrugated laminates(Olvey; Pg. 4, ll. 10) and since orientation increases the tear strength of the film.(Peer, Jr. et al.; Col. 6, ll. 15-19)

Regarding claims 3, 4, 8, and 9, Peer, Jr. et al. discloses pre-heating the liner laminate via a heating roll 4.(Figure 2)

Regarding claims 4 and 9, the liner is adhered to the corrugated web using an adhesive used for corrugating.(Peer, Jr. et al.; Col. 3, ll. 18)

Regarding claims 5 and 10, the corrugated web is fed from a pair of corrugating rolls.(Peer, Jr. et al.; Figure 2)

Response to Amendment

3. The declaration under 37 CFR 1.132 filed 12/15/03 is insufficient to overcome the rejection of claims 1-10 based upon Brownlee, Olvey et al. and Peers, Jr. et al. as set forth in the last Office action because: it appears to be a method of forming a different product. The declaration appears to indicate the solution to the problem of the prior art is to have the metal size of the metallized polyester adjacent the paper and to corona treat the polyester so it forms a better bond as in paragraph 19 of the declaration. However, bonding the corona treated surface would require the corona treated side to face the paper as this is the only surface it can be bonded to, and therefore one side of the polyester would be both corona treated and metallized, but the claims and specification require the metallization to be on the opposite side of the polyester from the corona treatment.

Response to Arguments

4. Applicant's arguments filed 12/15/03 have been fully considered but they are not persuasive.

Regarding applicant's argument that Brownlee is devoid of any description of how an inline process is to be achieved, the reference indicates the liner is bonded to the corrugated web which is bonded to another layer. Peer, Jr. et al. indicates that

bonding of a metallized polyester laminated to a liner which is joined to the corrugated web during corrugation is known in the art.

Regarding applicant's argument that the proposal in Brownlee, that an inline process does not present any special problems, is flawed and inaccurate, Peers, Jr. et al. shows that an inline process of bonding a metallized polyester laminated to a liner which is joined to the corrugated web during corrugation is known in the art and therefore since such a process is known, it would not be considered to present any special problems. It is noted that Peers, Jr. et al. is a U.S. patent and therefore is considered to be operative.

Regarding applicant's argument that Olvey does not disclose a pre-treated metallized polyester, the reference is used to show why corona or chemical treatment is desirable.

Regarding applicant's argument that Olvey does not disclose laminating the liner to the board during corrugation, examiner has not suggested such.

Regarding applicant's argument that Peers, Jr. et al. does not disclose corona treatment, Olvey does.

In response to applicant's argument in the declaration that the references do not disclose a solution to the problems applicant was trying to overcome or suggest the problems at all and to applicant's argument that Peer, Jr. et al. fails to consider the effect of heat on the corrugated board, the fact that applicant has recognized another advantage which would flow naturally from following the suggestion of the prior art

cannot be the basis for patentability when the differences would otherwise be obvious. See *Ex parte Obiaya*, 227 USPQ 58, 60 (Bd. Pat. App. & Inter. 1985).

Conclusion

5. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Barbara J. Musser** whose telephone number is **(571) 272-1222**. The examiner can normally be reached on Monday-Thursday; alternate Fridays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard Crispino can be reached on (571)-272-1226. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

BJM

RICHARD CRISPINO
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